

AMENDMENT IN THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claim 1. (Currently Amended) Apparatus for controlling a patient injection system including a first drive mechanism and a second drive mechanism, said apparatus comprising:

means for ~~selectably~~ selectively programming or establishing a first phase of an injection procedure, ~~said first phase comprising~~ as a flushing medium phase in operable association with the first drive mechanism, said flushing medium phase comprising a pressurized injection of flushing medium; and

means for ~~selectably~~ selectively programming or establishing a subsequent second phase of said ~~protocol~~ injection procedure as, said second phase comprising a contrast medium phase in operable association with the second drive mechanism, said contrast medium phase comprising a pressurized injection of contrast medium.

Claim 2. (Currently Amended) The apparatus of Claim 1, further comprising:

means for ~~selectably~~ selectively programming or establishing a subsequent third phase of said ~~protocol~~ injection procedure, said third phase further comprising at least one of contrast medium phase or a flushing medium phase.

Claim 3. (Currently Amended) The apparatus of Claim 1 wherein the means for ~~selectably~~ selectively programming or establishing a first phase as a flushing medium phase further comprises means for ~~selectably~~ selectively programming or establishing at least a quantity of a flushing medium.

Claim 4. (Currently Amended) The apparatus of Claim 1 wherein the means for ~~selectably~~ selectively programming or establishing a first phase as a flushing medium phase further comprises means for ~~selectably~~ selectively programming or establishing at least a quantity and flow rate of a flushing medium.

Claim 5. (Currently Amended) The apparatus of Claim 1 wherein the means for ~~selectably~~ selectively programming or establishing a first phase as a flushing medium phase further comprises a touch screen.

Claim 6. (Currently Amended) A fluid injection apparatus comprising:

~~at least one~~ a first drive mechanism adapted to pressurize a flushing medium;

a second drive mechanism adapted to pressurize a contrast medium; and

a control device in operable association with the first and second drive mechanisms, said control device operably associated with the at least one drive mechanism, said control device comprising means for selectively programming or establishing a first phase of an injection procedure as a pressurized flushing medium phase and means for selectively programming or establishing a subsequent second phase of said injection procedure as a pressurized contrast medium phase.

Claim 7. (Currently Amended) The apparatus of Claim 6 wherein ~~the~~ said control device further comprises means for programming or establishing a ~~second~~ third phase of the injection procedure, subsequent to the ~~first~~ second phase of the injection procedure, as a further contrast medium phase.

Claim 8. (Original) The apparatus of Claim 6 wherein said control device further comprises means for defining the first phase of the injection procedure by at least two injection parameters selected from fluid flow rate, fluid volume and injection duration.

Claim 9. (Previously Presented) The apparatus of Claim 6 wherein said control device further comprises means for defining the first phase by at least two injection parameters selected from fluid flow rate, fluid volume and injection duration.

Claim 10. (Currently Amended) The apparatus of Claim 6 wherein said control device further comprises means for programming or establishing a ~~second~~ third phase of the injection procedure, subsequent to the second phase of an injection procedure, as a further flushing medium phase.

Claim 11. (Currently Amended) The apparatus of Claim 6, further comprising at least two fluid containers operably associated with the ~~at least one~~ first or second drive mechanism.

Claim 12. (Original) The apparatus of Claim 11 wherein one fluid container contains a contrast medium and the other fluid container contains a flushing medium.

Claim 13. (Original) The apparatus of Claim 11 wherein at least one of the two fluid containers comprises a syringe.

Claim 14. (Canceled).

Claim 15. (Canceled).

Claim 16. (Canceled).

Claim 17. (Canceled).

Claim 18. (Canceled).

Claim 19. (Canceled).

Claim 20. (Canceled).

Claim 21. (Canceled).

Claim 22. (Currently Amended) A fluid injection apparatus comprising:

~~at least one~~ a first drive mechanism adapted to pressurize a flushing medium;

a second drive mechanism adapted to pressurize a contrast medium; and

a control device in operable association with the first and second drive mechanisms, said control device ~~operably associated with the at least one drive mechanism, said control device~~ comprising an arrangement for ~~selectably~~ selectively programming or establishing a first phase of an injection procedure as a pressurized flushing medium phase and an arrangement for selectively programming or establishing a subsequent second phase of said injection procedure as a pressurized contrast medium phase.

Claim 23. (Original) The apparatus of Claim 22 wherein the arrangement comprises a touch screen.

Claim 24. (Currently Amended) The apparatus of Claim 22 wherein said control device further comprises means for programming or establishing a ~~second~~ third phase of the injection procedure, subsequent to the ~~first~~ second phase of the injection procedure, as a further contrast medium phase.

Claim 25. (Original) The apparatus of Claim 22 wherein said control device further comprises means for defining the first phase of the injection procedure by at least two injection parameters selected from fluid flow rate, fluid volume and injection duration.

Claim 26. (Previously Presented) The apparatus of Claim 22 wherein said control device further comprises means for defining the first phase by at least two injection parameters selected from fluid flow rate, fluid volume and injection duration.

Claim 27. (Currently Amended) The apparatus of Claim 22 wherein said control device further comprises means for programming or establishing a ~~second~~ third phase of the injection

procedure, subsequent to the ~~first~~ second phase of an injection procedure, as a further flushing medium phase.

Claim 28. (Currently Amended) The apparatus of Claim 22, further comprising at least two fluid containers operably associated with the ~~at least one~~ first or second drive mechanism.

Claim 29. (Original) The apparatus of Claim 28 wherein one fluid container contains a contrast medium and the other fluid container contains a flushing medium.

Claim 30. (Original) The apparatus of Claim 28 wherein at least one of the two fluid containers comprises a syringe.

Claim 31. (Currently Amended) A method of programming an injection apparatus comprising:

~~selectably~~ selectively programming a first phase of an injection procedure, the first phase comprising a contrast medium phase; and

subsequently, ~~selectably~~ selectively programming a second phase of the injection procedure, the second phase comprising a KVO phase;

wherein the KVO phase is ~~selectably~~ selectively programmed by selecting a flow rate and a volume.

Claim 32. (Original) The method of Claim 31, further comprising:

programming a third phase of the injection procedure, the third phase comprising one of at least a contrast medium phase and a flushing medium phase.

Claim 33. (Currently Amended) The method of Claim 31 wherein the KVO phase is ~~selectably~~ selectively programmed by further selecting a duration.

Claim 34. (Currently Amended) A method of programming an injection apparatus including a first drive mechanism and a second drive mechanism, the method comprising:

~~selectably~~ selectively programming the injection apparatus to deliver a first phase of an injection procedure, ~~the first phase comprising as~~ a pressurized flushing medium phase by means of the first drive mechanism;

wherein the pressurized flushing medium phase is selectively programmed by selecting a flow rate and a volume; and

subsequently, selectively programming the injection apparatus to deliver a second phase of the injection procedure as a pressurized contrast medium phase by means of the second drive mechanism.

Claim 35. (Currently Amended) The method of Claim 34, further comprising:

programming a ~~second~~ third phase of the injection procedure, the ~~second~~ third phase further comprising one of at least a contrast medium phase and a flushing medium phase.

Claim 36. (Currently Amended) The method of Claim 34 wherein the flushing medium phase is ~~selectably~~ selectively programmed by further selecting a duration.

Claim 37. (Currently Amended) The apparatus of Claim 6 wherein the means for ~~selectably~~ selectively programming or establishing a first phase comprises a touch phase.

Claim 38. (Canceled).

Claim 39. (Currently Amended) A method of programming an injection apparatus, comprising:

~~selectably~~ selectively programming a first phase of an injection procedure, the first phase comprising a KVO phase;

wherein the KVO phase is ~~selectably~~ selectively programmed by selecting a flow rate and a volume.

Claim 40. (Original) The method of Claim 39, further comprising:

programming a second phase of the injection procedure, the second phase comprising one of at least a contrast medium phase and a flushing medium phase.

Claim 41. (Currently Amended) The method of Claim 39 wherein the KVO phase is ~~selectably~~ selectively programmed by further selecting a duration.

Claim 42. (New) The apparatus of Claim 1, wherein the second phase further comprises a KVO phase, wherein said KVO phase is selectively established by selecting a flow rate, a volume and a duration.

Claim 43. (New) The apparatus of Claim 6, wherein the second phase further comprises a KVO phase, wherein said KVO phase is selectively established by selecting a flow rate, a volume and a duration.

Claim 44. (New) The apparatus of Claim 22, wherein the second phase further comprises a KVO phase, wherein said KVO phase is selectively established by selecting a flow rate, a volume and a duration.

Claim 45. (New) The method of Claim 34, wherein the second phase further comprises a KVO phase, wherein said KVO phase is selectively established by selecting a flow rate, a volume and a duration.